715 REPAIR-REPLACE PCC SUBSTRUCTURE (Two Inches or Less in Depth)

715.01 GENERAL

The work for Repair-Replace PCC Substructure (Two Inches or Less in Depth) shall consist of cutting out deteriorated or unsound concrete in those areas shown on the plans and/or as directed by the Engineer, removal and disposal of old material and replacing with epoxy mortar to the lines and grades shown on the plans or as directed by the Engineer. This work shall also include sandblasting to bright metal all exposed reinforcing steel.

715.02 MATERIALS

Epoxy resin adhesive and epoxy mortar shall be in conformance with 821.10(B)(1) and 806.05(C).

715.03 CONSTRUCTION REQUIREMENTS

Areas two inches or less in depth shall be repaired with epoxy mortar. The limits of the repair areas shall be saw cut along neat lines to a depth of at least 1/2 inch. These areas shall be structurally sound and free from all dust, dirt, grease, paint and other foreign material. Exposed reinforcement shall be sandblasted to a bright metal. The concrete surfaces that are to be repaired shall then be blown clean with oil-free and clean air. The surfaces shall also be dry.

An epoxy resin adhesive shall be applied to these dry surfaces by brush or roller at the spreading rate of 40 square feet per gallon on moderately rough surfaces to 25 square feet per gallon on very rough surfaces. Adhesive shall be applied when the ambient air temperature is in excess of 60°F unless otherwise recommended by the manufacturer. Epoxy mortar shall be placed against or on the adhesive coating while the epoxy adhesive is still tacky. Epoxy resin adhesive shall be reapplied to dry areas and then immediately thereafter epoxy mortar shall be placed.

715.04 MEASURE AND PAYMENT

The unit of measure for Repair-Replace PCC Substructure (Two Inches or Less in Depth) will be the square yard. The number of square yards will be the total of the actual surface areas as measured in the field prior to placement of epoxy resin adhesive.

Payment for Repair-Replace PCC Substructure (Two Inches or Less in Depth) will be at the contract unit price per square yard, which payment will include removal and disposal of old materials, furnishing and applying epoxy resin adhesive, sandblasting, cleaning, and protection. Also included will be all labor, materials, tools, equipment, and incidentals necessary to complete thespecified work.